## Surgeon infects patient with hepatitis C

Phyllida Brown London

Officials at the Department of Health have no plans to introduce routine hepatitis C tests for healthcare workers after the announcement last week that a surgeon had infected a woman patient with the bloodborne virus. The incident is thought to be the third documented case of a patient being infected with the virus by a surgeon.

The surgeon, who had worked at the Pilgrim Hospital in Boston, Lincolnshire, since 1997, is on sick leave. A sample of his blood taken two years ago, before the woman's operation, was found to be positive for the virus. Since the case came to light, another blood sample, taken in 1993 by the hospital that then employed the surgeon, the Torbay District General Hospital, has also been found to be infected.

About 1600 women who have been operated on by the surgeon since then are being contacted and offered tests.

The Department of Health says that 0.5% of the population are estimated to be infected with hepatitis C virus. In the United States, national survey data suggest that the prevalence there may be about 1.8%, making it

the country's most common chronic bloodborne infection. The British blood supply has been screened for the virus since 1991.

Some types of surgery increase the risk that surgeons will receive a sharps or needlestick injury, thus potentially exposing the patient to their blood. The women to be contacted in the latest incident have all had gynaecological procedures that are known as "exposure prone," such as hysterectomy and caesarean section.

According to a report by the Senate of Surgery of Great Britain and Ireland, which represents the surgeons' royal colleges and others, gynaecology is one of the highest risk specialties for surgeon injury, with sharps injuries occurring in 10% of all procedures and up to 21% of vaginal hysterectomies.

The two previous documented cases of surgeon to patient transmission of hepatitis C virus involved cardiac surgery, another "exposure prone" specialty.

A spokeswoman for the Department of Health said that its advisory committee on hepatitis did not currently believe that testing of health workers for the virus was warranted because "the risk is so small."

Similarly, the United States does not recommend routine testing of health workers for the virus, saying that prevalence of infection in health workers is no



Hepatitis C virus: risk of surgeon to patient transmission deemed small

higher than in the general population.

James Johnson, chairman of the Joint Consultants Committee (a committee comprising representatives from the BMA and the medical royal colleges), argues that complete safety could never be guaranteed even if surgeons were tested for the virus four times a year.

Between one test and another, a surgeon could become infected and infect his or her patients. The risk appears to be low, and the costs of testing might not be justifiable, he said. "You are talking big money here, and we can never make it totally safe."

A report by the US Centers for Disease Control and Prevention says that the average incidence of infection with hepatitis C virus after unintentional needlestick or sharps exposure from a source positive for the virus, is 1.8%.

In the case of hepatitis B virus, which is thought to be more infectious, the Department of Health recommends testing for all health workers and immunisation. The department currently recommends that surgeons positive for both the hepatitis B surface and e antigens should avoid performing exposure prone procedures. Surgeons carrying out exposure prone procedures have to show that they are not e antigen positive or that they are immune.

These guidelines are currently under revision after reports of patients becoming infected by surgeons who did not express these antigens.

## Dutch consider obligatory testing of surgeons for hepatitis B

Tony Sheldon Utrecht

Pressure is mounting in the Netherlands for regular testing plus obligatory vaccination against viruses such as hepatitis B for medical and nursing staff working in areas where there is a risk of blood contact.

The calls follow an investigation into how up to 28 patients were infected with hepatitis B by a surgeon over four years at the Saint Joseph Hospital near Eindhoven. One patient subsequently passed the virus to his partner, who later died, probably as a result.

The investigation largely

exonerated the hospital. Patients were infected in the operating theatre, but there is no indication that operating procedures were lacking or hygiene measures inadequate. It concludes that the precise means of infection remains uncertain.

The surgeon was unaware that he carried the virus, having had a vaccination in 1985. It seems likely that he was infected before this while working in the tropics.

The investigation tested 1562 patients, and further investigations have now been launched

in two other Dutch hospitals and one German hospital, involving up to 2000 patients over the past decade.

Microbiologist Dr Ineke Weers-Pothoff, who led the investigation, said: "We thought precautions against infection in operating rooms were effective. Now we have learnt that they are not enough for some viral infections."

The public health inspection authority has said that there is a "great risk" to public health and supports obligatory testing. Together with the Dutch Health Council, it has been charged by the health minister, Els Borst, to investigate the possibility of introducing obligatory testing. In the short term, these two bodies will issue hospital guidelines on how to improve safety procedures.

In a television interview Mrs Borst said that she favoured obligatory vaccination against dangerous and rare viruses for all health staff working in situations where there could be contact with blood. Also, doctors and nurses should be regularly tested for infectious diseases. Doctors found to carry hepatitis B should no longer be allowed to work as surgeons in an operating theatre, she said.

Professor of epidemiology Roel Coutinho, who advised the hospital investigation, estimated that, though the voluntary vaccination system has been operating for 10 years, between a half and a third of the 2000 surgeons in the Netherlands have not been vaccinated. He predicts that 0.5-1% may carry hepatitis